ABSTRACT

Accordingly, this invention relates to an dry etching process for semiconductor wafers. More particularly, the present invention discloses a dry etching process including a halogen etchant (24) and a nitrogen gas (28) that selectively etches a compound semiconductor material (18) faster than the front-side metal layers (16A)(16B). Further, the dry etching process produces a vertical wall profile on compound semiconductor material (18) in both X (38) and Y (40) crystalline directions without undercutting the top of a via-opening.